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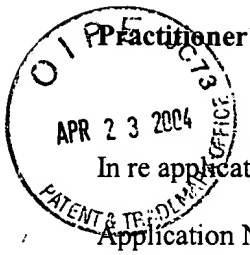

Practitioner's Docket No. 00CR002/KE ***PATENT***

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re application of: Steffensmeier et al.

Application No.: 09/648,830 Group No.: 2674
Filed: August 25, 2000 Examiner: K. Nguyen
For: Method And Apparatus For Extending The Life Of Matrix Addressed Emissive Display Devices

Mail Stop Appeal Briefs – Patents
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TRANSMITTAL OF APPEAL BRIEF
(PATENT APPLICATION--37 C.F.R. § 1.192)

1. Transmitted herewith, in triplicate, is the APPEAL BRIEF in this application, with respect to the Notice of Appeal filed on February 23, 2004.

2. STATUS OF APPLICANT

This application is on behalf of other than a small entity.

CERTIFICATION UNDER 37 C.F.R. §§ 1.8(a) and 1.10*
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Sheila K. Mathews
Signature

Date: April 23, 2004

Sheila K. Mathews
(type or print name of person certifying)

** Only the date of filing (' 1.6) will be the date used in a patent term adjustment calculation, although the date on any certificate of mailing or transmission under ' 1.8 continues to be taken into account in determining timeliness. See ' 1.703(f). Consider "Express Mail Post Office to Addressee" (' 1.10) or facsimile transmission (' 1.6(d)) for the reply to be accorded the earliest possible filing date for patent term adjustment calculations.*

3. FEE FOR FILING APPEAL BRIEF

Pursuant to 37 C.F.R. § 1.17(c), the fee for filing the Appeal Brief is:

other than a small entity $330.00

Appeal Brief fee due $330.00

4. EXTENSION OF TERM

The proceedings herein are for a patent application and the provisions of 37 C.F.R. § 1.136 apply.

Applicant believes that no extension of term is required. However, this conditional petition is being made to provide for the possibility that applicant has inadvertently overlooked the need for a petition and fee for extension of time.

5. TOTAL FEE DUE

The total fee due is:

Appeal brief fee	$330.00
Extension fee (if any)	$0.00

TOTAL FEE DUE $330.00

6. FEE PAYMENT

Authorization is hereby made to charge the amount of $330.00 to Deposit Account No. 18-1722.

A duplicate of this transmittal is attached.

7. FEE DEFICIENCY

If any additional extension and/or fee is required, and if any additional fee for claims is required, charge Deposit Account No. 18-1722.

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Atty. Dkt. No. 00CR002/KE

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE
BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES

Applicant: Steffensmeier et al.

Title: METHOD AND APPARATUS FOR EXTENDING THE LIFE OF MATRIX ADDRESSED EMISSIVE DISPLAY DEVICES

Appl. No.: 09/648,830

Filing Date: 08/25/2000

Examiner: Nguyen, Kevin M.

Art Unit: 2674

CERTIFICATE OF EXPRESS MAILING
I hereby certify that this correspondence is being deposited with the United States Postal Service's "Express Mail Post Office To Addressee" service under 37 C.F.R. § 1.10 on the date indicated below and is addressed to: **Commissioner for Patents, PO Box 1450, Alexandria, Virginia 22313-1450.**

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Sheila K. Mathews (Printed Name)

Sheila K. Mathews (Signature)

BRIEF ON APPEAL

Mail Stop – APPEAL BRIEF - PATENTS
Commissioner for Patents
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Alexandria, Virginia 22313-1450

Sir:

This paper is being filed in response to the final Office Action dated September 24, 2003 (finally rejecting Claims 1-20). The Notice of Appeal was filed on February 23, 2004. Appellant respectfully request reconsideration of the application.

Under the provisions of 37 C.F.R. §1.192, this Appeal Brief is being filed in triplicate together with the authorization is hereby given to charge Deposit Account 18-1722 the amount of $330.00 covering the Rule 17(c) appeal fee. If this fee is deemed to be insufficient, authorization is hereby given to charge any deficiency (or credit any balance) to the undersigned deposit account 18-1722.

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REAL PARTY IN INTEREST

The application was assigned to Rockwell Collins, Inc. having a place of business at City of Cedar Rapids, County of Linn, Iowa.

RELATED APPEALS AND INTERFERENCES

There are no related appeals or interferences.

STATUS OF CLAIMS

This is an appeal from the final Office Action mailed September 24, 2003, finally rejecting Claims 1, 3, 5-8, 10, 12-15, 17, 19, and 20 under 35 U.S.C. §102(e) as being unpatentable over U.S. Patent No 6,151,001 (Anderson et al.) and finally rejecting Claims 2, 4, 9, 11, 16 and 18 under 35 U.S.C. §103(a). No claims have been allowed. Claims 1-20 are pending in the application and are the subject of the present appeal.

STATUS OF AMENDMENTS

In response to the Final Office Action, the Applicant submitted Remarks on December 19, 2003 with arguments traversing the rejection of Claims 1, 3, 5-8, 10, 12-15, 17, 19, and 20 under 35 U.S.C. §102(e) and Claims 2, 4, 9, 11, 16 and 18 under 35 U.S.C. §103(a) and requesting reconsideration of the application. In an Advisory Action dated January 12, 2004, the Examiner stated "the request for reconsideration has been considered but does not place the application in a condition for allowance because of the reasons cited in the final Office Action." No amendment has been filed subsequent to the final Office Action.

SUMMARY OF INVENTION

The present invention relates to a method which can be used to reduce luminance decay of emissive elements 305 in a matrix addressed emissive display device 110. See Specification, Page 1, Paragraph 1.

The method includes generating control data corresponding to a static image 215 to be displayed on a matrix 210 of individually addressable emissive display elements 305. See Specification, Page 3, Paragraph 1. Drive signals are generated as a function of the control data, and are provided to the matrix 210 to thereby energize the corresponding emissive display elements 305 of the matrix 210 in order to display the static image 215 on the matrix 210. See Specification, Page 3, Paragraph 1. The control data are altered substantially continuously in order to substantially continuously move the static image 215 on the matrix 210. See Specification, Page 3, Paragraph 1.

Conventional emissive elements of emissive display devices are subject to decay with usage. See Specification, Page 2, Paragraph 2. In particular, matrix emissive display devices which are used to continuously or frequently display static images will experience decay of the emissive elements more rapidly. See Specification, Page 2, Paragraph 2. Static images will be retained on matrix type emissive display devices in time, due to luminance decay of the emissive elements. See Specification, Page 2, Paragraph 2.

A continuous and slow translation of the image remains unnoticeable to the viewer, but eliminates the need for particular emissive elements to be continuously "on" or at "full intensity". See Specification, Page 9, Paragraph 2. By avoiding maintaining emissive elements "on" or at "full intensity", decay of the emissive elements is significantly reduced.

Claim 1, the representative claim of the first group, is directed to a method of reducing luminance decay of emissive elements 305 in a matrix addressed emissive display device 110. The method includes generating control data corresponding to a static image 215 to be displayed on the matrix 210 of individually addressable emissive display elements 305, generating drive signals as a function of the control data, and providing a drive signals to the matrix 210 to thereby energize the corresponding emissive display elements 305 of the matrix 210 in order to display the static image 215 on the matrix 210. The method also includes altering the control data, substantially continuously, such that the drive signals are substantially continuously altered to thereby substantially continuously move the static image 215 on the matrix 210 in a manner which is substantially undetectable to viewers of the display device 110.

Claim 8, the representative claim of the second group, recites a matrix addressed emissive display device 110. Display device 110 includes a matrix 210 of individually addressable emissive display elements 305, a graphics engine 130 adapted to generate control data corresponding to a static image 215 to be displayed on the matrix 210, and display drive circuitry 120 coupled to the graphics engine 130 and adapted to generate drive signals as a function of the control data. The drive signals are provided to the matrix 210 to thereby energize the corresponding emissive display elements 305 of the matrix 210 in order to display the static image 215 on the matrix 210. The graphics engine 130 is configured to alter the control data, substantially continuously, such that drive signals are substantially continuously altered to thereby substantially continuously move the static image 215 on the matrix 210 in a manner which is substantially undetectable to viewers of the display device 110.

Claim 15, the representative claim of the third group, represents the matrix addressed emissive display device 110. The display device 110 includes a matrix 210 of individually addressable emissive display elements 305 and graphics means 130 for controlling the matrix 210 to display a static image 215 on the matrix 210 and to substantially continuously move the static image on the matrix 210 in a manner which is substantially undetectable to viewers of the display device 110.

Dependent claim 5, the representative claim of the fourth group, recites that that generating control data corresponding to the static image 215 to be displayed on the matrix 210 of individually addressable emissive display elements 305 further includes defining an image origin 230 for the static image 215, assigning the image origin 230 for the static image 215 to one emissive display element 305 in the matrix 210, and generating control data for each emissive display element 305 in the matrix 210 based on its respective position relative to the emissive display element 305 to which the image origin 230 has been assigned.

Dependent claim 6, the representative claim of the fifth group, recites that signing the image origin 230 further comprises initially assigning the image origin 230 for the static image 215 to a display image 225.

ISSUES

1. Whether Claims 1, 3, 5-8, 10, 12-15, 17, 19, and 20 of groups 1-5 may properly be rejected under 35 U.S.C. §102(e) over U.S. Patent No. 6,151,001 (Anderson et al.).

2. Whether Claim 2, 4, 9, 11, 16, and 18 of groups 1-3 may be properly rejected under 35 U.S.C. §103(a) over Anderson et al. in view of U.S. Patent No. 5,790,096 (Hill, Jr.).

GROUPING OF CLAIMS

For the purposes of this appeal only, the grouping of the claims is as follows:

1. Claims 1-4 essentially stand together or fall together and are therefore grouped together. Dependent claim 1 is the representative claim for the group because it is the broadest claim in the group.

2. Claims 8-11 essentially stand together or fall together and are therefore grouped together. Dependent claim 8 is the representative claim for the group because it is the broadest claim in the group.

3. Claims 15-18 essentially stand together or fall together and are therefore grouped together. Dependent claim 15 is the representative claim for the group because it is the broadest claim in the group.

4. Claims 5, 12, and 19 essentially stand or fall together and are therefore grouped together. Claim 5 depends from claim 1 and recites the additional feature of defining an image origin for the static image, assigning the image origin to an emissive display element in the matrix, and generating control data for each emissive display element in the matrix based on its respective position relative to the emissive display element to which the image origin has been assigned.

5. Claims 6, 7, 13, 14, and 20 essentially stand or fall together and are therefore grouped together. Claim 6 depends from claim 5 and recites the additional feature of assigning the image origin for the static image to a display origin.

Thus, Appellant respectfully requests individual consideration of each of the five groups herein described. The separate patentability of groups 1-5 is discussed below in the argument.

ARGUMENT

REFERENCES RELIED UPON

The following references were relied upon by the Examiner: U.S. Patent No 6,151,001 TO Anderson et al., issued November 21, 2000 and U.S. Patent No 5,790,096 to Hill, Jr. issued August 4, 1998.

BRIEF DESCRIPTION OF REFERENCES

1. U.S. Patent No 6,151,001 to Anderson et al. (hereinafter referred to as Anderson et al.) issued November 21, 2000. Anderson et al. teaches a method and apparatus for minimizing a false image artifacts in a digitally controlled display monitor. The method includes distributing a grayscale modulation in both time and space in a manner which minimizes the perception of a false image artifacts due to digitalization. (Anderson et al., Col. 3, Lines 35-37). Anderson et al. describes "patterns, one of mostly on sales and one of mostly off, which when sequentially updated appear to move in space--the eye can follow the diagonal bars. In FIG. 6c the patterns are 'mixed up' in space by reversing three space bits. In FIG. 6c the mixing is more complex utilizing exclusive or in conjunction with reversing. In this way it is arranged so that there is no pattern for the eye to follow." (Anderson et al., Col. 5, Line 67 to Col. 6, Line 7).

2. U.S. Patent No 5,790,096 to Hill, Jr. (hereinafter referred to as Hill) issued August 4, 1998. Hill teaches a microprocessor configured to store therein a complete set of flat-panel data and having parameters for each flat-panel interface module plug-in that may be used. Hill further teaches that all flat-panel display types including LCD, electroluminescent, gas plasma, FED, and other flat-panel types may be supported. (Hill, Col. 7, Lines 4-9).

BACKGROUND

The claim rejections to claims 1, 3, 5-8, 10, 12-15, 17, 19, and 20 in this appeal are made under 35 U.S.C. §102(e). The legal standards under 35 U.S.C. § 102(e) are well-settled. The "basic test" for anticipation of a patent claim by a prior art reference is this: to establish anticipation, there must be "identity of invention: the claimed invention, as described in appropriately construed claims, must be the same as that of the reference." Glaverbel S.A. v. Northlake Marketing & Supply, Inc., 45 F.3d 1550, 1554, 33 U.S.P.Q.2d 1496, 1498 (Fed. Cir. 1995). See also Continental Can Co. v. Monsanto Co., 948 F.2d 1264, 1267, 20 U.S.P.Q.2d 1746, 1748 (Fed. Cir. 1991). "The claimed invention is not anticipated under § 102 unless each and every element of the claimed invention is found in the prior art. Hybritech, Inc. v. Monoclonal Antibodies, Inc., 231 U.S.P.Q. 81, 90 (Fed. Cir. 1986).

The rejections of claims 2, 4, 9, 11, 16, and 18 at issue in this appeal are made under 35 U.S.C. §103(a). The legal standards under 35 U.S.C. §103(a) are well-settled. Obviousness under 35 U.S.C. §103(a) is a legal conclusion involving four factual inquiries:

(1) the scope and content of the prior art;

(2) the differences between the claims and the prior art;

(3) the level of ordinary skill in the pertinent art; and

(4) secondary considerations, if any, of nonobviousness.

Litton Systems, Inc. v. Honeywell, Inc., 87 F.3d 1559, 1567, 39 U.S.P.Q.2d 1321, 1325 (Fed. Cir. 1996). See also Graham v. John Deere Co., 383 U.S. 1, 148 U.S.P.Q. 459 (1996).

In proceedings before the Patent and Trademark Office (PTO), the Examiner bears the burden of establishing a prima facie case of obviousness based upon the prior art. In re Piasecki, 745 F.2d 1468, 1471-72, 223 U.S.P.Q. 785, 787-88 (Fed. Cir. 1984). "The Examiner can satisfy this burden only by showing some objective teaching in the prior art or that knowledge generally available to one of ordinary skill in the art would lead that individual to combine the relevant teachings of the references." In re Fritch, 972 F.2d 1260, 1265 (Fed. Cir. 1992); in re Fine, 837 F.2d 1071, 1074 (Fed. Cir. 1988); In re Lalu, 747 F.2d 703, 705, 223 U.S.P.Q. 1257, 1258 (Fed. Cir. 1984); Ashland Oil, Inc. v. Delta Resins & Refractories, Inc., 776 F.2d 281, 297 n.24, 227 U.S.P.Q. 657, 667 n.24 (Fed. Cir. 1985); ACS Hospital Systems, Inc. v. Montefiore Hospital, 782 F.2d 1572, 1577, 221 U.S.P.Q. 929, 933 (Fed. Cir. 1984). Obviousness cannot be established by combining the teachings of the prior art to produce the claimed invention, absent some teachings or suggestion supporting the combination. ASC Hospital Systems, Inc. v. Montefiore Hospital, 732 F.2d 1572, 1577, 221 U.S.P.Q. 929, 933 (Fed. Cir. 1984). Under 35 U.S.C. § 103(a), "teachings of references can be combined only if there is some suggestion or incentive to do so." In re Fritch, 972 F.2d 1260, 1266 (Fed. Cir. 1992).

"In order to rely on a reference as a basis for rejection of the applicant's invention, the reference must either be in the field of the applicant's endeavor or, if not, then be reasonably pertinent to the particular problem with which the inventor was concerned." In

re Oetiker, 977 F.2d 1443, 1447 (Fed. Cir. 1992); In re Deminski, 796, F.2d 436, 442, 230 U.S.P.Q. 313, 315 (Fed. Cir. 1986).

The combination of elements from non-analogous sources, in a manner that reconstructs the applicant's invention only with the benefit of hindsight, is insufficient to present a prima facie case of obviousness. There must be some reason, suggestion, or motivation found in the prior art whereby a person of ordinary skill in the field of the invention would make the combination. That knowledge can not come from the applicant's invention itself.

In re Oetiker, 977 F.2d 1443, 1447 (Fed. Cir. 1992). See also Diversitech Corp. v. Century Steps, Inc., 850 F.2d 675, 678-79, 7 U.S.P.Q.2d 1315, 1318 (Fed. Cir. 1988); In re Geiger, 815 F.2d 686, 687, 2 U.S.P.Q.2d 1276, 1278 (Fed. Cir. 1987); Interconnect Planning Corp. v. Feil, 774 F.2d 1132, 1147, 227 U.S.P.Q. 543, 551 (Fed. Cir. 1985).

REJECTIONS

1. The claims of groups 1-5 are patentable under 35 U.S.C. §102(e) because Anderson et al. fails to disclose each and every element of the claims in groups 1-5.

In Section 3 of the final Office Action, the Examiner rejected Claims 1, 3, 5-8, 10, 12-15, 17, 19 and 20 under 35 U.S.C. 102(e) as being anticipated Anderson et al. (US 6,151,001).

In rejecting Claim 1, the Examiner stated as follows:

> Anderson et al. teaches a method of controlling a pixel for matrix addressed emissive display device, the method comprising: generating a video input corresponding to a static image to displayed on a flat panel display of (figure 7, column

> 4, lines 17-18); generating a signals as a function of the control data (the col. 7, lines 30-36); providing the drive signals to the matrix to thereby energize the corresponding plasma display elements of the matrix in order to display the image on the matrix (see figure 7b. and 8, col. 7, lines 54-65); altering the pixel such that the driver signals are altered to move the image one the matrix in manner which is undetectable to viewers (see figures 6a, b, c, column 6, line 66 through column 6, line 7).

Anderson et al. does not disclose the subject matter recited in independent claims 1, 8, and 15. Specifically, Anderson et al. does not recited substantially continuously moving a static image on a matrix in a manner which is substantially undetectable to viewers of the display device.

The Examiner stated that Anderson et al. describes "a method of controlling a pixel for matrix addressed emissive display device". The Examiner seems to be suggesting that a single pixel may be a static image that is moved on the matrix. However, a pixel cannot be a static image, a pixel is an emissive element in a matrix. Anderson et al. itself states that "Each line 10 and consists of a row of pixels 12, which currently consists out of three colors subpixels at each pixel position." (Anderson et al., Col. 4, Lines 41-43). Accordingly, a pixel is an emissive display element used in the display of an image, and cannot be construed as an image itself.

Yet further, a pixel cannot be substantially, continuously moved, as recited in the claims of Groups 1-5. A pixel simply receives a value indicating a luminance, an on/off state, and/or a color (Anderson et al. Col. 4, Lines 45-51). There is no description in Anderson et al. of moving pixels as suggested by the Examiner.

In contrast, the present application states that "the object (static image) is displayed by controlling the luminance intensity of the emissive elements in the area of object position 220A relative to the luminance intensity of other emissive elements in matrix 210."

See Specification, Page 6, Paragraph 2. The object is clearly embodied in the control signal and is not the emissive elements or pixels.

Even if the Examiner is referring to a pattern created by control signals to the pixels as being the static image, it is clear that a pattern described in Anderson et al. is not a static image. Anderson et al. specifically describes patterns that are "mixed up" in space to various degrees, such that there's no pattern for the eye to follow." (Anderson et al., Col. 6, lines 4-7) A static image is, by definition, unchanging and cannot be "mixed up." Accordingly, a mixed up pattern cannot be a static image as recited in independent Claims 1, 8 and 15.

Further, if the Examiner is referring to the pattern created by control signals as being the static image, Anderson et al. only describes the patterns being "mixed up" in space and not being substantially, continuously moved. (Anderson et al., Col. 6, Lines 4-7) Mixing up a pattern is not substantially continuously moving an image, it is simply a rearrangement of the dynamic pattern in the fixed location in space.

Accordingly, for at least the reasons described above, each and every element of Claim 1, 8, and 15 are not described in Anderson et al. and cannot be anticipated by Anderson et al. Accordingly, independent Claims 1, 8 and 15 are patentable under 35 U.S.C. §102(e) over Anderson et al. Reconsideration and withdrawal of the rejection is respectfully requested.

2. The claims of group of 4 are patentable under 35 U.S.C. §102(e) because Anderson et al. fails to disclose each and every element of the claims in group 4.

Dependent Claim 5, the representative claim of group 4, recites defining an image origin for the static image, assigning the image origin for the static image to an

emissive display element in the matrix, and generating control data for each emissive display element in the matrix based upon its respective position relative to the emissive display element to which the image origin has been assigned. Anderson et al. does not contain any reference to any origin, yet alone an image origin that has been defined for a static image.

Accordingly, dependent Claims 5, 12 and 19 are patentable under 35 U.S.C. §102(e) over Anderson et al. Reconsideration and withdrawal of the rejection is respectfully requested.

3. The claims of group of 5 are patentable under 35 U.S.C. §102(e) because Anderson et al. fails to disclose each and every element of the claims in group 5.

Dependent Claim 6, the representative claim of group 5, recites that assigning the image origin further comprises initially assigning the image origin for the static image to the display origin. As stated above, Anderson et al. does not contain any reference to any origin yet alone the image origin and/or the display origin.

Accordingly, dependent Claims 6, 7, 13, 14, and 20 are patentable under 35 U.S.C. §102(e) over Anderson et al. Reconsideration and withdrawal of the rejection is respectfully requested.

4. The claims of group of 1 are patentable under 35 U.S.C. §103(a) over Anderson et al. and Hill because the combination of Anderson et al. and Hill does not teach the present intention.

The claims of groups 1-5 are patentable under 35 U.S.C. §103(a) over Anderson et al. and Hill because, even if combined, the combination of Anderson et al. and Hill does not teach the present invention. As stated above, Anderson et al. fails to teach or suggests altering control data, substantially continuously such that drive signals are

substantially continuously altered to thereby substantially continuously moved a static image on a matrix in a manner which is substantially undetectable to viewers of the display device. Similar to Anderson et al., Hill does not describe substantially continuously moving a static image on a matrix in a manner which is substantially undetectable to viewers of the display device.

A prima facie case of obviousness requires that the prior art references teach or suggests all of the claimed limitations. See In re Royka, 490 F.2d 981, 180 U.S.P.Q. 580 (CCPA 1974); MPEP, Edition 8(e8), August 2001, Sections 2142, 2143.03. Accordingly, Claims 2, 4, 9, 11, 16 and 18 of group 1 are patentable over Anderson et al. and Hill because neither Anderson et al. nor Hill provide any suggestion for substantially continuously moving a static image on a matrix. Reconsideration and withdrawal of the rejection is respectfully requested.

CONCLUSION

In view of the foregoing, Appellant submits that the claims are not properly rejected as being unpatentable under 35 U.S.C. §102(e) or under 35 U.S.C. §103(a) under the cited references. Accordingly, it is respectfully requested that the board reverse the claim rejections and indicate that a Notice of Allowance respecting all pending claims be issued.

Respectfully submitted,

Date 23 Apr 2004 By Nathan O Jensen

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APPENDIX – THE CLAIMS ON APPEAL

1. (Original) A method of reducing luminance decay of emissive elements in a matrix addressed emissive display device, the method comprising:

generating control data corresponding to a static image to be displayed on generating drive signals as a function of the control data;

providing the drive signals to the matrix to thereby energize the corresponding emissive display elements of the matrix in order to display the static image on the matrix; and

altering the control data, substantially continuously, such that the drive signals are substantially continuously altered to thereby substantially continuously move the static image on the matrix in a manner which is substantially undetectable to viewers of the display device.

2. (Original) The method of claim 1, wherein providing the drive signals to the matrix further comprises providing the drive signals to a matrix of light emitting diodes to thereby energize corresponding light emitting diodes of the matrix in order to display the static image on the matrix.

3. (Original) The method of claim 1, wherein providing the drive signals to the matrix further comprises providing the drive signals to a plasma display matrix in order to display the static image on the matrix.

4. (Original) The method of claim 1, wherein providing the drive signals to the matrix further comprises providing the drive signals to a field effect display matrix in order to display the static image on the matrix.

5. (Original) The method of claim 1, wherein generating control data corresponding to the static image to be displayed on the matrix of individually addressable emissive display elements further comprises:

defining an image origin for the static image;

assigning the image origin for the static image to an emissive display element in the matrix; and

generating control data for each emissive display element in the matrix based upon its respective position relative to the emissive display element to which the image origin has been assigned.

6. (Original) The method of claim 5, wherein assigning the image origin further comprises initially assigning the image origin for the static image to a display origin.

7. (Original) The method of claim 6, wherein altering the control data further comprises reassigning the image origin for the static image to a different emissive display element in the matrix such that the image origin moves relative to the display origin.

8. (Original) A matrix addressed emissive display device, comprising:

a matrix of individually addressable emissive display elements;

a graphics engine adapted to generate control data corresponding to a static image to be displayed on the matrix;

display drive circuitry coupled to the graphics engine and adapted to generate drive signals as a function of the control data, the drive signals being provided to the matrix to thereby energize the corresponding emissive display elements of the matrix in order to display the static image on the matrix; and

wherein the graphics engine alters the control data, substantially continuously, such that the drive signals are substantially continuously altered to thereby substantially continuously move the static image on the matrix in a manner which is substantially undetectable to viewers of the display device.

9. (Original) The matrix addressed emissive display device of claim 8, wherein the matrix is a matrix of light emitting diodes.

10. (Original) The matrix addressed emissive display device of claim 8, wherein the matrix is a plasma display matrix.

11. (Original) The matrix addressed emissive display device of claim 8, wherein the matrix is a field effect display matrix.

12. (Original) The matrix addressed emissive display device of claim 8, wherein the graphics engine is adapted to define an image origin for the static image and to assign the image origin for the static image to an emissive display element in the matrix, the graphics engine is further adapted to generate control data for each emissive display element in the matrix based upon its respective position relative to the emissive display element to which the image origin has been assigned.

13. (Original) The matrix addressed emissive display device of claim 12, wherein the graphics engine is adapted to initially assign the image origin for the static image to a display origin.

14. (Original) The matrix addressed emissive display device of claim 13, wherein the graphics engine is further adapted to alter the control data to substantially continuously move the static image on the matrix by substantially continuously reassigning

the image origin for the static image to a different emissive display element in the matrix such that the image origin moves relative to the display origin.

15. (Original) A matrix addressed emissive display device, comprising:

a matrix of individually addressable emissive display elements; and

graphics means for controlling the matrix to display a static image on the matrix and to substantially continuously move the static image on the matrix in a manner which is substantially undetectable to viewers of the display device.

16. (Previously Presented) The matrix addressed emissive display device of claim 15, wherein the matrix is a matrix of light emitting diodes.

17. (Previously Presented) The matrix addressed emissive display device of claim 15, wherein the matrix is a plasma display matrix.

18. (Previously Presented) The matrix addressed emissive display device of claim 15, wherein the matrix is a field effect display matrix.

19. (Previously Presented) The matrix addressed emissive display device of claim 15, wherein the graphics means is adapted to define an image origin for the static image and to assign the image origin for the static image to an emissive display element in the matrix, the graphics means further adapted to generate control data for each emissive display element in the matrix based upon its respective position relative to the emissive display element to which the image origin has been assigned.

20. (Previously Presented) The matrix addressed emissive display device of claim 19, wherein the graphics means is adapted to initially assign the image origin for the static image to a display origin and wherein the graphics means is further adapted to alter the control data to substantially continuously move the static image on the matrix by substantially

continuously reassigning the image origin for the static image to a different emissive display element in the matrix such that the image origin moves relative to the display origin.